

Newton's Third Law Review

Name: _____ Date: _____

Table: _____ Section: _____

1. Suppose you have two toy cars. Each has a mass of 0.04 kg. The cars have tape on their bumpers that will cause them to couple together. One car is stopped on the track. The other car, traveling at a velocity of 4 m/s, hits the first car. What is the momentum of the coupled cars?

2. What is the momentum of a 20-kg dog running at a speed of 8 m/s?

3. Could an elephant have the same momentum as a golf ball? Explain.

4. What does it mean to say that momentum is conserved?

5. How does the diagram illustrate Newton's third law of motion? In your answer, compare the force of the foot kicking the soccer ball with the force of the soccer ball on the foot.



6. Summarize Newton's Third Law with either a diagram, picture, or phrase to teach someone else about this law.